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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant: Bachovchin *et al.* Examiner: Lukton, D.
Serial No: 10/775,598 Art Unit: 1654
Filing Date: February 10, 2004
Title: Inhibitors of Dipeptidyl-Aminopeptidase Type IV

Mail Stop RCE
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Sir:

STATEMENT UNDER 37 C.F.R. §§ 1.56, 1.97, AND 1.98

Pursuant to the duty of disclosure under 37 C.F.R. §§ 1.56, 1.97 and 1.98, Applicant requests consideration of this Information Disclosure Statement.

Type of Statement

The present Information Disclosure Statement is:

An *original* Information Disclosure Statement; or
 A *supplemental* Information Disclosure Statement.

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October 16, 2006
Date

Signature

Heather A. Mariacher

Name of Person Signing

Compliance with 37 CFR § 1.97

'The present Information Disclosure Statement is being filed:

Pursuant to 37 CFR § 1.97(b); no fee or certification is required:

- Within three months of the filing date of a national application other than a continued prosecution application under § 1.53(d);
- Within three months of the date of entry of the national stage as set forth in § 1.491 in an international application;
- Before the mailing of a first Office action on the merits; or
- Before the mailing of a first Office action after the filing of a request for continued examination under § 1.114.

Pursuant to 37 CFR § 1.97(c) after the dates listed above but before the mailing date of any of a final action under § 1.113, a notice of allowance under § 1.311, or an action that otherwise closes prosecution in the application; Applicant hereby certifies that *either*:

each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement; or

That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the

information disclosure statement was known to any individual designated in § 1.56(c) more than three months prior to the filing of the information disclosure statement; or

- [] Includes herewith the fee set forth in § 1.17(p),
- [] Pursuant to 37 CFR § 1.97(d), after the mailing date of any final action under § 1.113, a notice of allowance under § 1.311, or an action that otherwise closes prosecution in the application; Applicant hereby *both*:
- [] Certifies that *either*:
- [] each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement; or
- [] That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in § 1.56(c) more than three months prior to the filing of the information disclosure statement; and
- [] Includes herewith the fee set forth in § 1.17(p).

Content of the Information Disclosure Statement

Applicant hereby makes of record in the above-identified application the reference(s) listed on the attached form PTO-1449 (modified). The order of presentation of the references should not be construed as an indication of the importance of the references.

Applicant includes copies of references as indicated below:

- A copy of each cited reference not indicated with an asterisk is included, except for U.S. patents and published U.S. patent applications for which the submission requirements has been waived by the PTO in the Official Gazette Notice of August 5, 2003, for applications filed after June 30, 2003;
- A copy of each of the references cited on the attached form PTO-1449 (modified) is enclosed, except for U.S. patents and published U.S. patent applications for which the submission requirement has been waived by the PTO in the Official Gazette Notice of August 5, 2003, for applications filed after June 30, 2003;
- Copies of references indicated with an asterisk on the attached form PTO-1449 are not included pursuant to 37 CFR § 1.98(d) because they were previously provided to the United States Patent Office in an Information Disclosure Statement that complies with 37 CFR § 1.98(a)-(c) and was submitted in the following patent application that is relied upon in the present case for an earlier effective filing date under 35 USC § 120:

Serial Number	Filing Date	Status
08/950,542	October 15, 1997	Issued

[] Copies of English translations of one or more non-English references are included.

Applicant hereby makes the following additional information of record in the above-identified application:

Applicant certifies that the Information Disclosure Statement *either*:

- [X] Does not contain non-English language citations;
- [] Includes one or more translations of a non-English citation; or
- [] Does contain non-English language citations, of which the following is a concise explanation:

Remarks

The submission of this Information Disclosure Statement should not be construed as a representation that a search has been made.

The submission of this Information Disclosure Statement shall not be construed to be an admission that the information cited in the statement is, or is considered to be, material to patentability as defined in § 1.56(b) .

The submission of this Information Disclosure Statement shall not be construed as a representation that the information cited in the Statement is, or is considered to be, in fact, prior art as defined by 35 USC § 102.

It is respectfully requested that:

1. The Examiner consider completely the cited information, along with any other information, in reaching a determination concerning the patentability of the present claims;
2. The enclosed form PTO-1449 be signed by the Examiner to evidence that the cited patent(s) and publication(s) has (have) been fully considered by the Patent and Trademark Office during the examination of this application; and

3. The citations for the patent(s) and publication(s) be printed on any patent which issues from this application.

Notwithstanding any statements by Applicants, the Examiner is urged to form his or her own conclusions regarding the relevance of the cited reference(s).

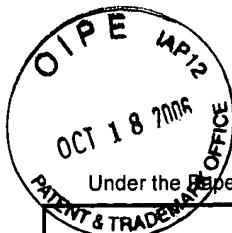
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Dated: October 16, 2006



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Substitute for form 1449/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet	1	Of	11	Attorney Docket Number	2002941-0100
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Complete if Known

Application Number	10/775,598
Filing Date	February 10, 2004
First Named Inventor	Bachovchin et al.
Art Unit	1654
Examiner Name	Lukton, D.

U.S. PATENT DOCUMENTS

Examiner Initials	Cite No. ¹	Document Number Number-Kind Code ² (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		US-4,318,904	March 9, 1982	Shaw, et al.	
		US-4,443,609	April 17, 1984	Oude Alink, et al.	
		US-4,499,082	February 12, 1985	Shenvi, et al.	
		US-4,582,821	April 15, 1986	Kettner, et al.	
		US-4,636,492	January 13, 1987	Kettner, et al.	
		US-4,644,055	February 17, 1987	Kettner, et al.	
		US-4,652,552	March 24, 1987	Kettner, et al.	
		US-4,935,493	June 19, 1990	Bachovchin, et al.	
		US-4,963,655	October 16, 1990	Kinder, et al.	
		US-5,093,477	March 3, 1992	Mölling, et al.	
		US-5,187,157	February 16, 1993	Kettner, et al.	
		US-5,215,926	June 1, 1993	Etchells, III, et al.	
		US-5,242,904	September 7, 1993	Kettner, et al.	
		US-5,250,720	October 5, 1993	Kettner, et al.	
		US-5,288,707	February 22, 1994	Metternich	
		US-5,296,604	March 22, 1994	Hanko, et al.	
		US-5,378,624	January 3, 1995	Berenson, et al.	
		US-5,444,049	August 22, 1995	de Nanteuil, et al.	
		US-5,462,928	October 31, 1995	Bachovchin, et al.	
		US-5,506,130	April 9, 1996	Peterson, et al.	
		US-5,527,923	June 18, 1996	Klingler, et al.	
		US-5,543,396	August 6, 1996	Powers, et al.	
		US-5,554,728	September 10, 1996	Basava, et al.	
		US-5,635,386	June 3, 1997	Palsson, et al.	
		US-5,635,386	June 3, 1997	Fei, et al.	
		US-5,646,043	July 8, 1997	Emerson, et al.	
		US-5,965,532	October 12, 1999	Bachovchin	
		US-6,040,145	March 21, 2000	Huber, et al.	
		US-6,100,234	August 8, 2000	Huber, et al.	
		US-6,503,882	January 7, 2003	Huber, et al.	
		US-6,692,753	February 17, 2004	Huber, et al.	
		US-6,825,169	November 30, 2004	Bachovchin, et al.	

FOREIGN PATENT DOCUMENTS

Examiner Initials	Cite No. ¹	Foreign Patent Document Country Code ³ -Number ⁴ -Kind Code ⁵ (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages Or Relevant Figures Appear	T ⁶
		*DD-158109	December 29, 1982	Fischer, et al.		
		*DD-270382 A1	July 26, 1989	Neubert, et al.		
		*DD-296075 A5	November 21, 1991	Neubert, et al.		
		*EP-0 356 223 A2	February 28, 1990	Desolms, et al.		
		*EP-0 371 467 A2	June 6, 1990	Kleemann, et al.		
		*EP-0 420 913 B1	November 15, 1995	Zimmerman, et al.		
		*EP-0 471651 A2	February 19, 1992	Metternich		
		*EP-0 481 311 A2	April 22, 1992	Dorsch, et al.		
		EP-0 528 858 B1	January 22, 1997	Bachovchin, et al.		
		*EP-0 615 978 A1	September 21, 1994	de Nanteuil, et al.		
		*EP-0 688 788 A1	December 27, 1995	de Nanteuil, et al.		
		*WO-89/03223	April 20, 1989	Bachovchin, et al.		
		*WO-91/16339	October 31, 1991	Bachovchin, et al.		
		*WO-91/17767	November 28, 1991	Bachovchin, et al.		
		*WO-92/12140	July 23, 1992	Powers		
		*WO-92/17490	October 15, 1992	Hester, et al.		
		*WO-93/02057	February 4, 1993	Carr, et al.		
		*WO-93/05011	March 18, 1993	Cottens, et al.		
		*WO-93/08259	April 29, 1993	Bachovchin, et al.		
		*WO-93/10127	May 27, 1993	Snow, et al.		
		*WO-93/16102	August 19, 1993	Morimoto, et al.		
		*WO-94/03055	February 17, 1994	Takacs, et al.		
		*WO-94/09132	April 28, 1994	Morimoto, et al.		
		*WO-94/20526	September 15, 1994	Cook, et al.		
		*WO-94/25873	November 10, 1994	Hall, et al.		
		*WO-94/28915	December 22, 1994	Hovanessian, et al.		
		*WO-94/29335	December 22, 1994	Antonsson, et al.		
		*WO-95/11689	May 4, 1995	Bachovchin, et al.		
		*WO-95/15309	June 8, 1995	Jenkins, et al.		
		*WO-95/12618	May 11, 1995	De Meester, et al.		
		*WO-95/29190	November 2, 1995	Hovanessian, et al.		
		*WO-95/29691	November 9, 1995	Powers, et al.		
		*WO-95/34538	December 21, 1995	Augustyns, et al.		
		*WO-96/40858	December 19, 1996	Armstrong, et al.		
		*WO-96/40263	December 19, 1996	Berninger, et al.		
		WO-98/50046	November 12, 1998	Huber, et al.		
		WO-98/50066	November 12, 1998	Brigitte, et al.		

Examiner Signature		Date Considered
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This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

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<p>Substitute for form 1449/PTO</p> <p>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</p> <p><i>(Use as many sheets as necessary)</i></p>			Complete if Known		
			Application Number	10/775,598	
			Filing Date	February 10, 2004	
			First Named Inventor	Bachovchin et al.	
			Art Unit	1654	
Examiner Name	Lukton, D.				
Sheet	3	Of	11	Attorney Docket Number	2002941-0100

NON PATENT LITERATURE DOCUMENTS

Examiner Initials	Cite No. ¹	Include the name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
		*Aguila, et al., "From stem cells to lymphocytes: Biology and transplantation", <i>Immun Rev</i> , 157 : 13-40, 1997.	
		*Austin, et al., "Proximity versus Allostery: The Role of regulated protein dimerization in biology", <i>Chemistry & Biology</i> , 1 : 131-36, 1994.	
		*Bachovchin, et al., "Inhibition of IGA1 proteinases from neisseria gonorrhoeae and hemophilus influenzae by peptide prolyl boronic acids", <i>J Biol Chem</i> , 265 : 3738-43, 1990.	
		*Bailey, "An introduction to peptide chemistry", <i>Wiley</i> , 1-81, 1990. (Table of Contents)	
		*Barton, et al., "Binding of the T Cell activation monoclonal antibody tal to dipeptidyl", <i>J. of Leukocyte Biology</i> , 48 : 291-96, 1990. (Abstract only)	
		*Baugh, et al., "Proteinases and tumor invasion", 165 : 157-179, 1980.	
		*Bodansky, "Peptide Chemistry, A Practical Textbook", <i>Springer-Verlag</i> , 1-9, 1988.	
		*Bodansky, "Principles of Peptide Synthesis", <i>Springer-Verlag</i> , 16 , 1984. (Cover page, title pages, Vol. 16 cover page and pages VII-XIII only)	
		*Bodansky, "Principles of Peptide Synthesis", <i>Springer-Verlag</i> , 21 , 1984	
		*Boros, et al., "Fluoroolefin peptide isosteres-tools for controlling peptide conformations", <i>Tetrahedron Letters</i> , 35 : 6033-36, 1994.	

		*Bough, et al., "Role and potential therapeutic value of proteinase inhibitors in tissue destruction", Raven Press NY, 157-80, 1980. (ISBN 0-89004-515-1)	
		*Brady, et al., "Reflections on a peptide", <i>Nature</i> , 368 : 692-3, 1994.	
		*Brander, et al., <i>J. of Immunol.</i> , 155 (5): 2670-78, 1995. (Abstract only)	
		*Brenchley, et al., <i>Nephrology, Dialysis, Transplantation</i> , 7 Suppl (1): 121, 1992.	
		*Bristol, et al., "Characterization of a novel rat thymocyte costimulating monoclonal antibody 1.3", <i>J. of Immunol.</i> , 148 : 332-38, 1992. (Abstract only)	
		*Bristol, et al., "Thymocyte costimulating antigen is CD26 (dipeptidyl-granulocyte, macrophage, t lineage cell proliferation via CD26", <i>J. of Immunol.</i> , 149 : 367-72, 1992. (Abstract only)	
		*Bungy, et al., <i>Eur. J. of Immunol.</i> , 24 (9): 2098-2103, 1994. (Abstract only)	
		*Chan, et al., <i>Archives of Ophthalmology</i> , 113 (5): 597-600, 1995. (Abstract only)	
		*Chazenblak, et al., <i>J. of Clinical Investigation</i> , 92 (1):62-74, 1993. (Abstract only)	
		*Colowich, et al., "Methods in Enzymology", p.220-225.	
		*Cordes, et al., "Transition states for hydrolysis of acetals, ketals, glycosides and glycosylamines", <i>Transition States of Biochemical Processes</i> , Plenum Press, Ch. II: 429-66, 1978. (ISBN 0-306-31092-9)	
		*Coutts, et al., "Structure-activity relationships of boronic acid inhibitors of dipeptidyl peptidase IV.1. Variation of the P2 position of X22-boroPro dipeptides", <i>J. Med. Chem.</i> , 39 : 2087-94, 1996.	
		*Dang, et al., "Cell surface modulation of CD26 by anti-1F7 monoclonal antibody: analysis surface expression and human T cell activation", <i>J. of Immunol.</i> , 145 : 3963-71, 1990. (Abstract only)	
		*Darcy, et al., <i>J. of Immunol.</i> , 149 (11): 3636-3641, 1992. (Abstract only)	
		*Darmoul, et al., "Dipeptidyl Peptidase IV (CD26) Gene Expression in enterocyte-like colon lines HT-29 and Caco-2: Cloning of the complete human coding sequence and changes of dipeptidyl peptidase IV mRNA levels during cell differentiation", <i>J. of Biological Chemistry</i> , 267 : 2200-08, 1992.	
		*Daw, et al., <i>J. of Immunol.</i> , 156 (2): 818-25, 1996. (Abstract only)	

		*De Caestecker, et al., "The detection of intercytoplasmic interleukin 1 (alpha) expression monocytes using two colour immunofluorescence flow cytometry", <i>J. Immunol. Methods</i> , 154 : 11-20, 1992. (Abstract only)	
		**Dependent on the expression of the T cell receptor/CD3 complex", <i>J. of Immunol.</i> , 141 : 1103. (Abstract only)	
		*Demuth, et al., "Design of (Omega-N-(O-ACYL)Hydroxy Amid) Aminodicarboxylic acid pyrrolidides as potent inhibitors of praline-specific peptidases", <i>FEBS Lett.</i> , 320 : 23-27, 1993.	
		*Dudler, et al., <i>Eur. J. of Immunol.</i> , 25 (2): 538-542, 1995. (Abstract only)	
		*Duke-Cohn, et al., "Targeting of an activated T-Cell subset using a bispecific toxin conjugat directed against CD4 and CD26", <i>Blood</i> , 82 (7): 2224-2234, 1993. (Abstract only)	
		*Dupont, "Immunology of hematopoietic stem cell transplantation: A brief review of its history", <i>Immun Rev</i> , 157 : 5-12, 1997.	
		*Ebenbichler, et al., "Structure-function relationships of the HIV-1 envelope V3 determinant: evidence for two distinct conformations", <i>Aids</i> , 7 : 639-46, 1993.	
		*El Far, et al., <i>J. of Neurochemistry</i> , 64 (4): 1696-1702, 1995.	
		*Fauci, et al., "The human immunodeficiency virus: Infectivity and mechanisms of pathogenesis", <i>Science</i> , 239 : 617:722, 1988. (Abstract only)	
		*Fleischer, et al., "Triggering of Cytotoxic T Lymphocytes and NK Cells via the Tp103 Pathway is dependents on the expression of the T Cell receptor/ CD3 complex", <i>J. of Immunol.</i> , 141 : 1103-07. (Abstract)	
		*Flentke, et al., "Inhibition of dipeptidyl aminopeptidase IV (DP-IV) by XAA-boropro dipeptides and use of these inhibidores to examine the role of DP-IV in T-cell function", <i>Proc Natl Acad Sci USA</i> , 88 : 1556-59, 1991.	
		*Ford, <i>Handbook of Experimental Immunology</i> , Weir. Ed., Blackwell Scientific Publications, Oxford, 1978.	
		*Freeman, et al., "Clinical & Experimental Immunology", 88 (2): 275-79, 1992. (Abstract only)	
		*Goodman, et al., "On the concept of linear modified retro-peptide structures", <i>Accounts of Chemical Research</i> , 12 : 1-7, 1979.	
		*Goodstone, et al., <i>Annals of the Rheumatic Diseases</i> , 55 (1): 40-6, 1996. (Abstract only)	

		*Guichard, et al., "Partially modified retro-inverso pseudopeptides as non-natural ligands for the human class I histocompatibility molecule HLA-A2", <i>J Med Chem</i> , 39 : 2030-39, 1996.	
		*Gunther, et al., "Solution structures of the DP IV (CD26) inhibitor Val-BoroPro determined by NMR spectroscopy", <i>Magnetic Resonance in Chem</i> , 33 : 959-70, 1995.	
		*Gutheil, et al., "Separation of L-Pro-DL-Boropro into its component diastereomers and kinetic analysis of their inhibition of dipeptidyl peptidase IV. A new method for the analysis of slow, tight-binding inhibition", <i>Biochemistry</i> , 32 : 8723-31, 1993.	
		*Hall, et al., <i>Seminars in Dermatology</i> , 10 (3): 240-5, 1991. (Abstract only)	
		*Hart, et al., <i>Pharmaceutical Biotechnology</i> , 6 : 821-45, 1995. (Abstract only)	
		*Hegen, et al., "Enzymatic activity of CD26(Dipeptidylpeptidase IV is not signaling function in T cells", <i>Immunobiology</i> , 189 : 483-93, 1993.	
		*Hegen, et al., "Function of dipeptidyl peptidase IV (CD26, TP103) in transfected", <i>Cell Immunol</i> , 146 : 249-60, 1993. (Abstract only)	
		*Hegen, et al., "The T Cell triggering molecule Tp103...", <i>J. Immunol</i> , 144 : 2980. (Abstract only)	
		*Heins, et al., "Mechanism of proline-specific proteinases: (I) substrate specificity of peptidase Iv from pig kidney and proline-specific endopeptidase from <i>flavobacterium meningosepticum</i> ", <i>Biochimica Et Biophysica Acta</i> , 954 : 161-69, 1988. (Abstract only)	
		*Ikagawa, et al., <i>J. of Allergy & Clinical Immunol.</i> , 97 (1 Pt. 1): 53-64. (Abstract only)	
		*James, et al., <i>Clinical & Experimental Rheumatology</i> , 13 (3): 299-305, 1995. (Abstract only)	
		*Jameson, et al., "A rationally designed CD4 analogue inhibits experimental encephalomyelitis", <i>Nature</i> , 368 : 744-46, 1994. (Abstract only)	
		*Janeway, et al., "Immunobiology-The Immune System in health and disease", <i>Current Biology LTD</i> , Ch. 12: 1-35, 1994.	
		*Jardetzky, et al., "Three-dimensional structure of a human class II histocompatibility molecule complexed with superantigen", <i>Nature</i> , 368 : 711-18, 1994.	
		*Jiang, et al., "Inhibition of Human Immunodeficiency Virus Type 1 Infection in a T-Cell Line (CEM) by new dipeptidyl-peptidase IV (CD26) inhibitors", <i>Res. Virol.</i> , 148 : 255-66, 1997.	

		*Jorgensen, et al., "Molecular Components of T-cell recognition", <i>Annu. Rev Immunol.</i> , 10 : 835-73, 1992. (Abstract only)	
		*Kalluri, et al., <i>J. of the American Society of Nephrology</i> , 6 (4): 1178-85, 1995. (Abstract only)	
		*Kameoka, et al., "Differential CD26-mediated activation of CD3 and CD2 CD6-depleted allogenic bone marrow transplantation", <i>Blood</i> , 85 : 1132-37, 1995.	
		*Kameoka, et al., "Direct association of adenosine deaminase with a T cell CD26", <i>Science</i> , 261 : 466-69, 1993. (Abstract only)	
		*Karges, et al., <i>Molecular Aspects of Medicine</i> , 16 (2): 29-213, 1995.	
		*Kelly, et al., "Immunosuppressive boronic acid dipeptides: Correlation between conformation and activity", <i>J Am Chem Soc</i> , 115 : 12637-38, 1993.	
		*Kelly, et al., "The efficient synthesis and simple resolution of a praline boronate ester enzyme inhibition studies", <i>Tetrahedron</i> , 49 : 1009-16, 1993. (Abstract only)	
		*Kettner, et al., "Kinetic properties of the binding of alpha-lytic protease to peptide boronic acids", <i>Biochemistry</i> , 27 : 7682-7688, 1988.	
		*Kettner, et al., "Inhibition of the serine proteases leukocyte elastase, pancreatic elastase, cathepsin G, and chymotrypsin by peptide boronic acids.", <i>J. Biol. Chem.</i> , 259 : 15106-14, 1984.	
		*Kettner, et al., "Peptide boronic acid inhibitors of trypsin-like proteases, their preparation and use as anticoagulants nad inflammation inhibitors", <i>Chemical Abstracts</i> , 112 : 80 (91790c), 1990.	
		*Kinder, et al., "Analogues of carbamyl aspartate as inhibitors...", <i>J. Med. Chem.</i> , 33 : 819-23, 1990.	
		*Kinder, et al., <i>J. Med. Chem.</i> , 28 : 1917-25, 1985. (Abstract only)	
		*Kokawa, et al., <i>Eur. J. of Hematology</i> , 50 (2): 74-80, 1993. (Abstract only)	
		*Kubota, et al., "Dipeptidyl peptidase IV (DPIV) activity in serum and on lymphocytes of MRL/Mp-lpr/lpr mice correlates with disease onset", <i>Clin Exp Immunol</i> , 96 : 292-96, 1994.	
		*Kubota, et al., "Involvement of dipeptidyl peptidase IV in an in vivo immune response", <i>Clin Exp Immunol</i> , 89 : 192-7, 1992.	
		*Kuchroo, et al., "A Single TCR Antagonist Peptide inhibits experimental mediated by a diverse T cell repertoire", <i>J. of Immunol.</i> , 153 : 3326-36, 1994. (Abstract only)	

		*Kuchroo, et al., "Cytokines and adhesion molecules contribute to the ability of myelin proteolipid protein-specific T cell clones to mediate experimental allergic encephalomyelitis", <i>J of Immunol.</i> , 151 : 4371-82, 1993. (Abstract)	
		*Kuchroo, et al., "Experimental allergic encephalomyelitis mediated by cloned T cells synthetic peptide of myelin proteolipid protein. Fine specificity and T cell receptor V beta usage", <i>J. of Immunol.</i> , 148 : 3776-82, 1992. (Abstract only)	
		*Kuchroo, et al., "Induction of experimental allergic encephalomyelitis by myelin specific T cell clones and synthetic peptides", <i>Pathobiology</i> , 59 : 305-12, 1991 (Abstract only)	
		*Kuchroo, et al., "T-cell receptor alpha chain plays a critical role in antigen-specific cell function", <i>Proceedings of the Nat'l Academy of Sciences of the United States of America</i> , 88 :8700-04, 1991. (Abstract only)	
		*Kuchroo, et al., "T-cell receptor (TCR) usage determines disease susceptibility in autoimmune encephalomyelitis: Studies with TCR V Beta *2 Transgenic Mice", <i>J. of Experimental Medicine</i> , 179 : 1659-64, 1994. (Abstract only)	
		*Lopez, et al., <i>Vaccine</i> , 12 (7): 585-91, 1994. (Abstract only)	
		*Lington, et al., <i>Eur. J. of Immunol.</i> , 22 (7): 1813-17, 1992. (Abstract only)	
		*Linsley, et al., "Effects of anti-gp120 monoclonal antibodies on CD4 receptor binding protein of human immunodeficiency virus type 1", <i>J. of Virology</i> , 62 : 3695-702, 1988. (Abstract only)	
		*Liu, et al., <i>J. of Immunol.</i> , 155 (11): 5449-5454, 1995. (Abstract only)	
		*Matteson, et al., "Synthesis and properties of pinanediol α -amido boronic esters", <i>Organometallics</i> , 3 : 1284, 1984.	
		*Mittrucker, et al., "The cytoplasmic tail of the T cell receptor zeta chain is signaling via CD26", <i>Eur J Immunol</i> , 25 : 295-97, 1995. (Abstract only)	
		*Morimoto, et al., 1F7 "A novel cell surface molecule, involved in helper function of CD4", <i>Immunol</i> , 143 : 34030-39, 1989 & published erratum in <i>J. Immunology</i> , 144 (5): 2027, 1990. (Abstract only)	
		*Mosmann, "Cytokine patterns during the progression to AIDS", <i>Science</i> , 265 : 193-94, 1994.	
		*Mullins, et al., <i>J. of Clinical Investigation</i> , 96 (1): 30-7, 1996. (Abstract only)	
		*Nardelli, et al., <i>J. of Immunol.</i> , 148 (3): 914-20, 1992. (Abstract only)	

		*Nicola, et al., "Guidebook to cytokines and their receptors", <i>Sambrook</i> , p. 1-257. (Table of contents only)	
		*O'Brien, et al., <i>Immunology</i> , 86 (2): 176-182, 1995. (Abstract only)	
		*Ostresh, et al., "Generation and Use of nonsupport-bound peptide and peptidomimetic combinatorial libraries", <i>Methods in Enzymology</i> , Academic Press, San Diego, 267 (13): 1996. ISBN 0-12-182168-4	
		*Panina-Bordignon, et al., "Universally Immunogenic T Cell epitopes: Promiscuous binding MHC class II and Promiscuous recognition by T cells", <i>Eur. J. Immunol.</i> , 19 : 2237-42, 1989. (Abstract only)	
		*Perry, et al., <i>Eur. J. of Immunol.</i> , 26 (1): 136-41, 1996. (Abstract only)	
		*Perstorp Biotec Compay, "Molecular Biology Catalog", 1994. (Table of Contents only)	
		*Powers, et al., "Elastase inhibitors for treatment of emphysema-NHLBI workshop summary", <i>US Dept. of Health and Human Services</i> , 1097-1100, 1985.	
		*Protti, et al., <i>Immunol. Today</i> , 14 (7): 363-68, 1993. (Abstract only)	
		*Reynolds, et al., <i>J. of Immunol.</i> , 152 (1): 193-200, 1994. (Abstract only)	
		*Rini, et al., "Crystal structure of a human immunodeficiency virus type 1 neutralizing 50.1, complex with its V3 loop peptide antigen", <i>Proceedings of the Nat'l Academy of Sciences of the United States of America</i> , 90 : 6325-9, 1993. (Abstract only)	
		*Ritu, et al., <i>Vaccine</i> , 10 (11): 761-65, 1992. (Abstract only)	
		*Scharpe, et al., "Purified and cell-bound CD26: Enzymatic inhibition, antibody and expression on T cells in relation to other surface markers", <i>Verh K Acad Geneeskd Belg.</i> , 56 : 537-559, 1994. (Abstract only)	
		*Schmitz, et al., "Potentiation of the immune response in HIV-1 + individuals", <i>J Clin Invest</i> , 97 : 1545-49, 1996.	
		*Schon, et al., "Dipeptidyl peptidase IV in human T lymphocytes. An approach to the role membrane peptidase in the immune syetem", <i>Biomedica Biochimica Acta</i> , 45 : 1523-28, 1986. (Abstract only)	
		*Schon, et al., "Dipeptidyl peptidase IV in the immune system. Effects of specific enzyme on activity of dipeptidyl peptidase IV and proliferation of human lymphocytes", <i>Biological Chemistry Hoppe Seyler</i> , 372 : 305-11, 1991.(Abstract only)	

		*Schon, et al., "The dipeptidyl peptidase IV, a membrane enzyme involved in the proliferation", <i>Biomedica Biochimica Acta</i> , 44 , 1985. (Abstract only)	
		*Schon, et al., "The role of dipeptidyl peptidase IV in human T lymphocyte activation. Antibodies against dipeptidyl peptidase IV suppress lymphocyte proliferation and immunoglobulin synthesis in vitro", <i>Eur. J. of Immunol.</i> , 17 : 1821- 26, 1987. (Abstract only)	
		*Seed, "Making agonists of antagonists", <i>Chemistry & Biology</i> , 1 : 125-29, 1994.	
		*Shimojo, et al., <i>Int'l Archives of Allergy & Immunol.</i> , 105 (2): 155-61. (Abstract only)	
		*Snow, et al., "Studies on proline boronic acid dipeptide inhibitors of dipeptidyl peptidase IV: Identification of a cyclic species containing a B-N bond", <i>J. Am Chem Soc</i> , 116 : 10860-69, 1994.	
		*Songyang, et al., "SH2 Domains recognize specific phosphopeptide sequences", <i>Cell</i> , 72 : 767-78, 1993.	
		*Sudmeier, et al., "Solution structures of active and inactive forms of the DP IV (CD26) inhibitor Pro-Boropro determined by NMR spectroscopy", <i>Biochemistry</i> , 33 : 12427-38, 1994.	
		*Subramanyam, et al., "CD26 at-cell accessory molecule induction of antigen-specific immune-suppression by inactivation of CD26: A clue to the AIDS paradox?", <i>Dipeptidyl Peptidase IV(CD26) in Metabolism and Immune Responses</i> , Ed. B. Fleischer: 155-62, 1995.	
		*Subramanyam, et al., "Mechanism of HIV-1 tat induced inhibition of antigen-specific t responsiveness", <i>J. of Immunol.</i> , 150 : 2544-53, 1993. (Abstract only)	
		*Tam, "Synthetic peptide vaccine design: Synthesis and properties of a high-density multiple antigenic peptide system", <i>Proc. Natl Acad Sci USA</i> , 85 : 5409-56413, 1988.	
		*Tanaka, et al., "Cloning and functional expression of the T cell activation", <i>J Immunol</i> , 149 : 481-86, 1992.	
		*Tanaka, et al., "Cloning and functional expression of the T cell activation antigen CD26", <i>Immunol</i> , 149 : 481-86, 1992; published erratum appears in <i>J. Immunol.</i> , 50 (5): 2090, 1993.	
		*Tanaka, et al. "The costimulatory activity of the CD26 antigen requires IV enzymatic activity", <i>Proc. Natl. Acad Sci USA</i> , 90 : 4586-90, 1993. (Abstract only)	
		*Thompson, "Peptide Aldehydes: Potent Inhibitors of Serine and Cysteine Proteases", <i>Methods in Enzymology</i> , XLVI (19): 220-25, 1977.	
		*Thompson, "Use of Peptide Aldehydes to generate transition-state analogs of elastase",	

		<i>Biochemistry</i> , 12 :1: 47-51, 1973.	
		*Ulbo, et al., <i>J. of Autoimmunity</i> , 7 (3): 399-411, 1994. (Abstract only)	
		*Van Noort, et al., <i>Nature</i> , 375 (6534): 798-801, 1995. (Abstract only)	
		*Watson, "Continuous proliferation of murine antigen specific helper T Lymphocytes", <i>J. of Experimental Medicine</i> , 150 :1510, 1979.	
		*Welch, et al., "Fluoroolefin containing dipeptide isosteres as inhibitors of dipeptidyl peptidase IV (CD26)", <i>Tetrahedron</i> , 52 :291-304, 1995.	
		*Wyse-Coray, et al., "Use of antibody/peptides constructs of direct antigenic peptides to evidence for T cells processing and presentation", <i>Cellular Immunol.</i> , 139 (1): 268-73, 1992. (Abstract only)	
		*Yoshimoto, et al., "Comparison of inhibitory effects of proline-containing peptide derivatives on prolyl...", 98 : 975-79, 1985.	

		*Zhu, et al., <i>J. of Immunol.</i> , 155(10): 5064-73, 1995. (Abstract only)	
		*Zimmerman, et al., "A new approach to T-cell activation: Natural and Synthetic Conjugated capable of activating T cells", <i>Vaccine Res.</i> , 5: 91-102, 1996.	
		*Zimmerman, et al., "Immunization with peptide heteroconjugates primes a T helper cell", <i>Vaccine Res.</i> , 5: 103-118, 1996.	

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